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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/527,178	04/27/2005	Harmin Muller	09600-00029-US	9984

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EXAMINER

BOYKIN, TERRESSA M

ART UNIT PAPER NUMBER

1711

DATE MAILED: 10/03/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/527,178

Applicant(s)

MULLER ET AL.

Examiner

Terressa M. Boykin

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 3-7-5.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-24 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-24 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date 3-7-05.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1- 24 are rejected under 35 U.S.C. 102(b) as being anticipated by USP 5087676 cols 1- 4; or EP 1199315 pages 1- 4; EP 1199316 pages 1-5.

USP 5087676 discloses polymers are prepared from olefinically unsaturated monomers in an aqueous medium using a free radical initiator system which is soluble in this medium and consists of an oxidizing agent, a reducing agent and an iron salt, by a process in which a corresponding redox initiator system which contains a vanadium salt is used in addition to this iron-containing redox initiator system, and the content of olefinically unsaturated residual monomers in aqueous polymer mixtures or solutions is reduced by this process.

EP 1199316 discloses an aqueous emulsion polymer is prepared by providing an ethylenically unsaturated monomer(s) and free radical redox initiator system under emulsion polymerization conditions. The redox initiator system comprises a water-soluble oxidizing agent, a water insoluble oxidizing agent, and a sulfonic acid reducing agent. Specifically the reference discloses a process for reducing the residual ethylenically unsaturated monomer content of an aqueous emulsion polymer, comprising contacting the emulsion polymer with the free radical redox initiator system,

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and effecting the polymerization of the residual ethylenically unsaturated monomer.

The process may be used for preparing an aqueous emulsion polymer used in paints, paper coatings, leather coatings, adhesives, nonwoven, and paper saturants.

The method leads to lowered residual monomer levels and lowered volatile organic compound (VOC) levels.

Likewise, the reference **EP 11999315** discloses an aqueous emulsion polymer is prepared by providing an ethylenically unsaturated monomer(s) and free radical redox initiator system under emulsion polymerization conditions. The redox initiator system comprises a water-soluble oxidizing agent, a water insoluble oxidizing agent, and a sulfonic acid reducing agent. Likewise, the reference discloses a process for reducing the residual ethylenically unsaturated monomer content of an aqueous emulsion polymer, comprising contacting the emulsion polymer with the free radical redox initiator system, and effecting the polymerization of the residual ethylenically unsaturated monomer. The process may be used also for preparing an aqueous emulsion polymer used in paints, paper coatings, leather coatings, adhesives, nonwoven, and paper saturants. The method leads to lowered residual monomer levels and lowered volatile organic compound (VOC) levels.

USP 3692726 discloses a process for the production of dispersions containing polymers or copolymers, practically free from monomers, which are obtained by emulsion polymerization or copolymerization in a aqueous medium in which monomers are used which contain unsaturated acids or their esters such as acrylic acid or their esters, emulsifiers, water-soluble redox-systems with pH values between 2 and 6s and

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peroxy compounds the improvement comprising adding peresters and/ or perketals to the reaction mixture, the decomposition tempers of the peresters or perketals being preferably between 30 –150 C., so that the mixture is polymerized at the polymerization temperature until the residual monomer content becomes negligible.

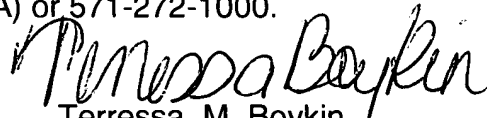
Each of the references discloses a process for removing or reducing residual monomers or particles in an aqueous polymer dispersion as claimed by applicants. Any properties or characteristics inherent in the prior art, e.g. viscosity, PH, temperature during the after treatment, pressure etc. , although unobserved or detected by the reference, would still anticipate the claimed invention. Note In re Swinehart, 169 USPQ inherently possessed by things in the prior art, does not cause claim drawn to those things ". Since the disclosed are expressed differently , they nevertheless appear to overlap those claimed and thus are not distinguishable over the prior art. In view of the above, there appears to be no significant difference between the reference(s)and that which is claimed by applicant(s). Any differences not specifically mentioned appear to be conventional. Consequently, the claimed invention cannot be deemed as novel and accordingly is unpatentable.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Terressa M. Boykin whose telephone number is 571 272-1069. The examiner can normally be reached on Monday-Thursday 10-5:30 Friday (work at home).

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



Terressa M. Boykin
Primary Examiner
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